

MagNA Pure LC 2.0 System

Improved Design – Proven Performance

The MagNA Pure LC 2.0 System continues our tradition of innovating automated nucleic acid isolation to provide true walk-away precision and improved lab productivity.

- **Save time with fully automated isolation** of DNA, RNA, or viral nucleic acid with proven magnetic-bead technology.
- **Count on quality-controlled reagent kits** with optimized protocols.
- **Rely on surveillance features** such as automatic clot detection, tip loss detection, and sample tracking.
- **Protect samples** with a drop catcher, HEPA filter system, and UV decontamination.
- **Ensure data integrity** by utilizing LIMS/network connectivity features for easy data management.

Proven Performance

The MagNA Pure LC 2.0 System is the successor to the MagNA Pure LC 1.0 System, which was launched in 1999 and is in use worldwide in more than 1,000 laboratories.

As shown in many publications, the MagNA Pure LC System is a versatile and reliable tool for isolating highly pure nucleic acids. For details on references, visit www.magnapure.com.

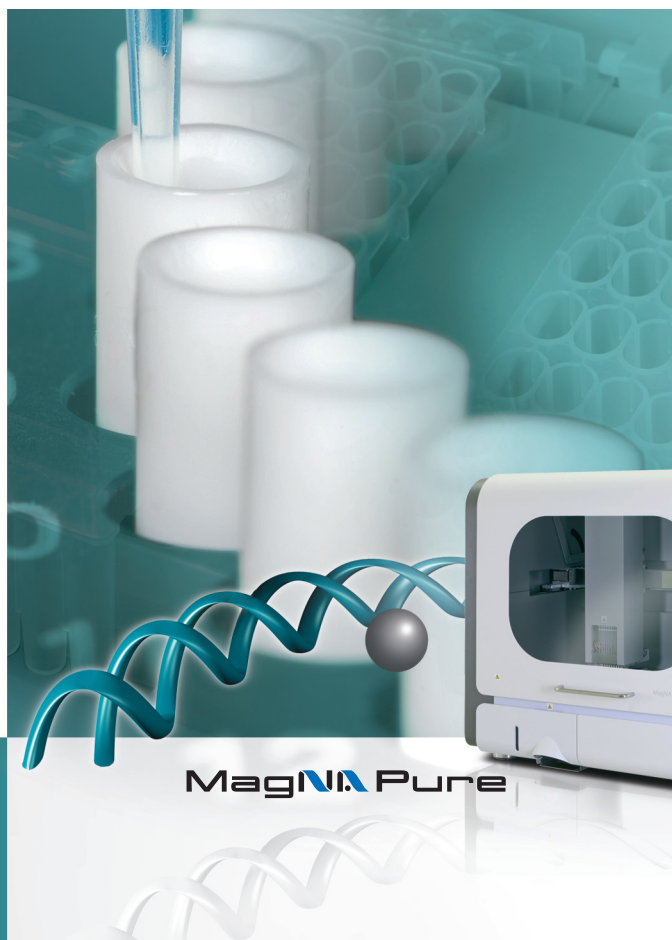
MagNA Pure LC 2.0 Design Improvements

Hardware

- Modernized housing featuring modified front door
- Integrated computer and touchscreen LCD monitor
- Improved UV decontamination
- Easy-to-clean stage with new surface material
- New solid-waste container with larger capacity

Software

- LIMS/network connectivity
- Updated software with new Graphical User Interface
- Operating system based on Windows XP
- Integrated searchable results database
- Separate post-elution software for external PC



MagNA Pure

Applications

The MagNA Pure LC 2.0 System provides consistent isolation of DNA, RNA, and viral nucleic acid from a broad range of research sample materials. The high-quality, purified nucleic acids are suitable for direct use in molecular biology applications such as PCR, RT-PCR, sequencing, and array analysis.

In addition, the MagNA Pure LC 2.0 System performs fully automated pipetting of post-elution processes such as PCR setup.

- Select from 10 versatile kits to purify genomic or bacterial DNA, total RNA, or viral DNA/RNA.
- Use a wide variety of sample materials, including: whole blood, blood cells, cultured cells, plasma, serum, sputum, stool, bronchoalveolar lavage, mammalian tissue, formalin-fixed, paraffin-embedded (FFPE) tissue, body fluids, plant tissue, fungus, bacteria, and food products.
- Perform isolations in batch sizes of 8 – 32 samples.
- Use sample/elution volumes of 20 – 1,000 µl / 50 – 200 µl.
- Purify 32 samples in 52 – 180 minutes or less, according to batch size.

Comparison Testing

The new MagNA Pure LC 2.0 System was tested in direct comparison with the MagNA Pure LC 1.0 System for performance in DNA and RNA isolation using various MagNA Pure LC kits. All applications tested gave comparable results (see example data, Table 1).

Sample	MagNA Pure LC 1.0 System			MagNA Pure LC 2.0 System		
	Yield (µg)	Purity (OD _{260/280})	qPCR (CP)	Yield (µg)	Purity (OD _{260/280})	qPCR (CP)
Sample 1	3.7	1.85	19.7	3.8	1.82	19.3
Sample 2	5.9	1.81	19.3	6.6	1.84	19.0
Sample 3	5.8	1.85	19.3	6.2	1.83	19.0
Sample 4	6.0	1.87	19.5	7.1	1.85	19.0

Table 1: Comparison of the MagNA Pure LC 1.0 System with the MagNA Pure LC 2.0 System. Results for the MagNA Pure LC DNA Isolation Kit I using 200 µl of human blood research samples from four different donors are shown. Analysis was done via OD, agarose gel, and PCR with the LightCycler® System. Results for DNA yield, purity, and LightCycler® PCR crossing points (CP) are shown (mean values of fourfold replicates).

For details, see *Biochemica* No. 3, 2008, pages 20 – 22 at

www.roche-applied-science.com/publications/biochemica.htm

MagNA Pure LC 2.0 System Specifications

Hardware

- Standalone tabletop instrument
- Dimensions: W 40 in x D 26 in x H 35 in
(W 108 cm x D 77 cm x H 91 cm)
- Weight: 395 lbs (170 kg)
- Piston-driven 8-channel nozzle head
- Positive-displacement liquid handling
- Integrated PC with touchscreen monitor and keyboard
- Data exchange via network/LIMS connection, CD drive, or USB port
- 1 heating block, 2 cooling blocks
- UV lamp, HEPA filter, sensor for tip loss and clot detection
- PCR vessels: LightCycler® Capillaries; LightCycler® 480 Multiwell Plate 96; COBAS® AmpliCor® A-ring; generic vessels such as 96-well plates, strips, and tubes.

Software

- Purification software with ready-to-use protocols
- Additional software for PCR setup protocols

Ordering Information

Product	Cat. No.
MagNA Pure LC 2.0 Instrument	05 197 686 001

Visit www.magnapure.com to learn more about the new MagNA Pure LC 2.0 System and its broad range of applications, and to view detailed information on MagNA Pure LC reagent kits, disposables, and accessories.

For general laboratory use.

MAGNA PURE, LC, LIGHTCYCLER, COBAS, and AMPLICOR are trademarks of Roche. Other brands or product names are trademarks of their respective holders.

Published by

Roche Diagnostics
Roche Applied Science
Indianapolis, Indiana

© 2008 Roche Diagnostics.
All rights reserved.

58125231208